All of the claims in this application have been allowed and the Issue Fee and Transmittal of Formal Drawings are being filed concurrently. Applicants respectfully request that this application be allowed to proceed to issuance.

Respectfully submitted,

Dated: August 8, 2003

Jaye G. Heybl
Attorney for Applicants
Registration No. 42,661

KOPPEL JACOBS PATRICK & HEYBL
555 St. Charles Drive, Suite #107
Thousand Oaks, CA 91360
(805)373-0060

VERSION WITH MARKINGS TO SHOW CHANGES MADE

Paragraph on page 9, line 26 to page 10, line 4:

In this example, the two curves intersect at 44GHz (point 40 in the graph). Thus, forming the waveguide with a resonant frequency of 44GHz will allow the waveguide to transmit a 44 GHz signal as if propagating in free space. Changes in the impedance structure's resonant frequency changes the signal's propagation constant. Due to the near-vertical slope of curve 32 at lower frequencies and its near-horizontal slope at higher frequencies, increasing the structure's resonant frequency results in only small changes in the signals propagation constant, while reducing the resonant frequency causes a significant change in the beam's propagation constant.

Paragraph on page 17, line 21 to page 18, line 7:

The module 114 can be comprised of any of the above described waveguides. If waveguide 10 from FIG. 1 is used each of the module's waveguides [112] 113 can only impart a single phase shift to its beam portion. If each portion of the beam passing through each of the modules waveguides [112] 113 receives the same phase shift, the beam continues to propagate on the same line but its phase is shifted by passing through the module 114. Alternatively, the beam can be steered to a single desired angle by setting the waveguides to impart linearly progressive phase increments from waveguide to waveguide. To steer the beam to the left, the phase shifts of the beam portions in the respective waveguides are incrementally increased from the right to left waveguides, in each of the module's rows. To steer the beam down the phase shift is incrementally increased in along each column of the

module's waveguides. The beam can also be steered off angle by combining the row and column incremental increases. To steer the beam down and to the left, the phase shifts are incrementally increased from right to left and from top to bottom.